



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|--|-----------------------------|
| 10/737,106 | 12/15/2003 | Gerald L. Everett | 200315774-1 | 5509 |
| 22879 | 7590 | 02/19/2010 | | |
| HEWLETT-PACKARD COMPANY Intellectual Property Administration 3404 E. Harmony Road Mail Stop 35 FORT COLLINS, CO 80528 | | | EXAMINER BRAGDON, REGINALD GLENWOOD | |
| | | | ART UNIT 2189 | PAPER NUMBER |
| | | | NOTIFICATION DATE 02/19/2010 | DELIVERY MODE ELECTRONIC |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

JERRY.SHORMA@HP.COM
ipa.mail@hp.com
laura.m.clark@hp.com

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES

Ex parte GERALD L. EVERETT, GREGORY T. ANDERSEN,
and SAM MILLER

Appeal 2009-002487
Application 10/737,106
Technology Center 2100

Decided: February 17, 2010

Before LANCE LEONARD BARRY, HOWARD B. BLANKENSHIP, and
JAMES R. HUGHES, *Administrative Patent Judges*.

BARRY, *Administrative Patent Judge*.

DECISION ON APPEAL

STATEMENT OF THE CASE

The Patent Examiner rejected claims 1-25. The Appellants appeal therefrom under 35 U.S.C. § 134(a). We have jurisdiction under 35 U.S.C. § 6(b).

INVENTION

The Appellants describe the invention at issue on appeal as follows.

[A] firmware module is relocated from a read-only memory ["ROM"] location to a writeable memory location during a system boot-up operation. A portion of the writeable memory location is reserved which comprises a memory allocation for the firmware module and an additional memory allocation. Without prior knowledge of system resource allocation, the additional memory allocation is designated as a run-time data area.

(Spec. at 21.)

ILLUSTRATIVE CLAIM

1. A computer implemented method for establishing a run-time data area comprising:

relocating a firmware module from a read-only memory location to a writeable memory location during a system boot-up operation;

reserving a portion of said writeable memory location comprising a memory allocation for said firmware module and an additional memory allocation; and

designating said additional memory allocation as said run-time data area, wherein said run-time data area is created without requiring prior knowledge of system resource allocation.

PRIOR ART

| | | |
|---------|--------------------|---------------|
| Cepulis | US 2004/0123092 A1 | June 24, 2004 |
| Maleck | US 6,611,912 B1 | Aug. 26, 2003 |
| Fish | US 6,199,159 B1 | Mar. 6, 2001 |

REJECTIONS

Claims 2-4 stand rejected under 35 U.S.C. 112, ¶ 2, as indefinite.

Claims 1-3, 8-14, and 18-22 stand rejected under 35 U.S.C. § 102(e) as anticipated by Cepulis.

Claims 1, 8, and 18 stand rejected under § 102(e) as anticipated by Maleck.

Claims 5-7, 15-17, and 23-25 stand rejected under 35 U.S.C. §103(a) as unpatentable over Maleck and Fish.

INDEFINITENESS OF CLAIMS 2-4

The Examiner finds that "[c]laim 2 recites the limitation 'said system call requesting said memory allocation'." (Answer 3.) He concludes that "[w]hile there is an antecedent basis for a generic system call for a system firmware feature (which can be a call for any system feature), there is no specific system call for any memory allocation." (*Id.* at 8.) The Examiner further concludes that "[i]t is also not clear whether 'said system call' is for

one memory allocation or three separate allocations." (*Id.* at 3.) The Appellants allege that they "have fulfilled the requirements for providing antecedent basis for the limitation in question." (App. Br. 9.)

ISSUE

Therefore, the issue before us is whether the Appellants have shown error in the Examiner's conclusion that claims 2-4 are indefinite. Based on the Appellants' arguments, we will decide the appeal on the basis of claim 2 alone with respect to this issue. *See* 37 C.F.R. § 41.37(c)(1)(vii).

LAW

"The legal standard for definiteness is whether a claim reasonably apprises those of skill in the art of its scope." *In re Warmerdam*, 33 F.3d 1354, 1361 (Fed. Cir. 1994) (citing *Amgen Inc. v. Chugai Pharma. Co.*, 927 F.2d 1200, 1217 (Fed. Cir.1991)). The "inquiry therefore is merely to determine whether the claims do, in fact, set out and circumscribe a particular area with a reasonable degree of precision and particularity." *In re Moore*, 439 F.2d 1232, 1235 (CCPA 1971). Furthermore, a claim is indefinite "where the language 'said lever' appears in a dependent claim where no such 'lever' has been previously recited in a parent claim to that dependent claim" *Ex parte Moelands*, 3 USPQ2d 1474, 1476 (BPAI 1987).

FINDING OF FACT ("FF")

1. Claim 2 recites in pertinent part the following limitations: receiving a system call for a system firmware feature; and

returning a response to said system call requesting said memory allocation for said firmware module, said additional memory allocation, and a memory allocation for said system firmware feature.

ANALYSIS

The first clause of claim 2 recites "a system call for a system firmware feature." (FF 1.) The second clause of the same claim recites "said system call requesting said memory allocation for said firmware module, said additional memory allocation, and a memory allocation for said system firmware feature." (*Id.*)

As previously mentioned, the Examiner explains why he has concluded that the first clause provides no antecedent basis for the second clause and why the second clause is indefinite apart from the question of antecedent basis. The Appellants fail to address the Examiner's explanation. We agree with the Examiner that they "merely allege[] that there is sufficient antecedent basis without providing any real argument." (Answer 8.) Furthermore, the Appellants fail to even allege error in Examiner's explanation that it is unclear whether "said system call" refers to one memory allocation or three allocations. Such an allegation and omission do not establish error.

CONCLUSION

Based on the aforementioned facts and analysis, we conclude that the Appellants have shown no error in the Examiner's conclusion that claims 2-4 are indefinite.

ANTICIPATION OF CLAIMS 1-3, 8-14, and 18-22 OVER CEPULIS

The Examiner makes the following findings.

Cepulis discloses . . . relocating a firmware module from a read-only memory location to a writeable memory location during a system boot-up operation (figure 2, page 3, paragraph 16, figure 2 shows a flow diagram of a boot process where PAL [i.e., processor abstraction layer] and SAL [i.e., system abstraction layer] BIOS ROM procedures are executed; pages 3-4, paragraph 19, "In order to facilitate efficient reading and execution of the PAL and SAL routines, embodiments of this invention copy or shadow the PAL and SAL routines to a shadow area of the main memory array."

(Answer 4.) He further finds that "Cepulis also discloses that PAL and SAL ROM codes are executed during boot-up process and are available after the boot-up process as well (paragraph 19)." (Ans. 10.) The Appellants make the following argument.

In paragraph 17, Cepulis teaches "the computer system may have the capability of logically partitioning the computer resources and then executing multiple operating systems, one in each partition." This is very different from "relocating a firmware module from a read-only memory location to a writeable memory location during a system boot-up operation," as claimed.

(App. Br. 11.)

ISSUE

Therefore, the issue before us is whether the Appellants have shown error in the Examiner's finding that Cepulis relocates a firmware module from a ROM location to a writeable memory location during a system boot-up operation. Based on the Appellants' arguments, we will decide the appeal on the basis of claim 1 alone with respect to this issue. *See* 37 C.F.R. § 41.37(c)(1)(vii).

LAW

"It is axiomatic that anticipation of a claim under § 102 can be found only if the prior art reference discloses every element of the claim, and that anticipation is a fact question" *In re King*, 801 F.2d 1324, 1326 (Fed. Cir. 1986) (citing *Lindemann Maschinenfabrik GMBH v. Am. Hoist & Derrick Co.*, 730 F.2d 1452, 1457 (Fed. Cir. 1984)).

ANALYSIS

As previously mentioned, The Examiner's rejection relies on Figure 2 and paragraphs 16 and 19 of Cepulis. The Appellants fail, however, to address Figure 2, paragraph 16, or paragraph 19 of the reference. Instead, they merely "cite[] a portion of a single sentence in paragraph 17 of Cepulis . . . and conclude[] that this is different from the disputed limitation." (Answer 9.) Like the Examiner, we "do[] not understand how 'proving' (by citing a passage that is . . . not relied upon by the Examiner in the rejection) that Cepulis teaches something in addition to what Appellant [sic] claimed proves that Cepulis does not teach the limitation in dispute." (*Id.* at 9-10.)

CONCLUSION

Based on the aforementioned facts and analysis, we conclude that the Appellants have shown no error in the Examiner's finding that Cepulis relocates a firmware module from a ROM location to a writeable memory location during a system boot-up operation.

ANTICIPATION OF CLAIMS 1, 8, AND 18 OVER MALECK AND OBVIOUSNES OF CLAIMS 5-7, 15-17, AND 23-25 OVER MALECK AND FISH

The Examiner finds that "Appellant's [sic] 'relocating' is copying of ROM code to a writeable location (see Appellant's [sic] specification, figure 2A) just as Malek's [sic] 'shadowing' is (see Malek [sic], figure 2)." (Ans. 10.) The Appellants argue that "[w]ith the present invention, the firmware is relocated and not shadowed, as with Malek [sic]." (App. Br. 12.)

ISSUE

Therefore, the issue before us is whether the Appellants have shown error in the Examiner's finding that Maleck relocates a firmware module from a ROM location to a writeable memory location. Based on the Appellants' arguments, we will decide the appeal on the basis of claim 1 alone with respect to this issue. *See* 37 C.F.R. § 41.37(c)(1)(vii).

LAW

"[T]he PTO gives claims their 'broadest reasonable interpretation.'" *In re Bigio*, 381 F.3d 1320, 1324 (Fed. Cir. 2004) (quoting *In re Hyatt*,

211 F.3d 1367, 1372 (Fed. Cir. 2000)). In giving claims their broadest reasonable interpretation, "the words of a claim 'are generally given their ordinary and customary meaning.'" *Phillips v. AWH Corp.*, 415 F.3d 1303, 1312 (Fed. Cir. 2005) (en banc) (internal citations omitted). The "ordinary and customary meaning of a claim term is the meaning that the term would have to a person of ordinary skill in the art in question at the time of the invention, i.e., as of the effective filing date of the patent application." *Id.* at 1313. "Moreover, limitations are not to be read into the claims from the specification." *In re Van Geuns*, 988 F.2d 1181, 1184 (Fed. Cir. 1993) (citing *In re Zletz*, 893 F.2d 319, 321 (Fed. Cir. 1989)).

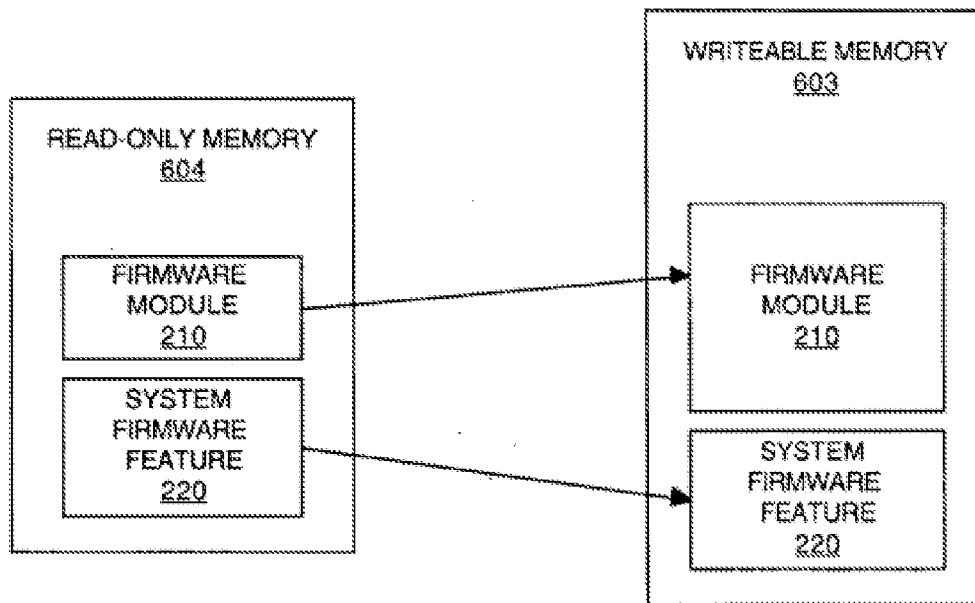
"Argument in the brief does not take the place of evidence in the record." *In re Schulze*, 346 F.2d 600, 602 (CCPA 1965) (citing *In re Cole*, 326 F.2d 769, 773 (CCPA 1964)). "An assertion of what seems to follow from common experience is just attorney argument and not the kind of factual evidence that is required to rebut a prima facie case of obviousness." *In re Geisler*, 116 F.3d 1465, 1470 (Fed. Cir. 1997) (citing *In re Wood*, 582 F.2d 638, 642 (CCPA 1978); *In re Lindner*, 457 F.2d 506, 508 (CCPA 1972)).

FINDINGS OF FACT

2. The Appellants' Figure 2A follows.

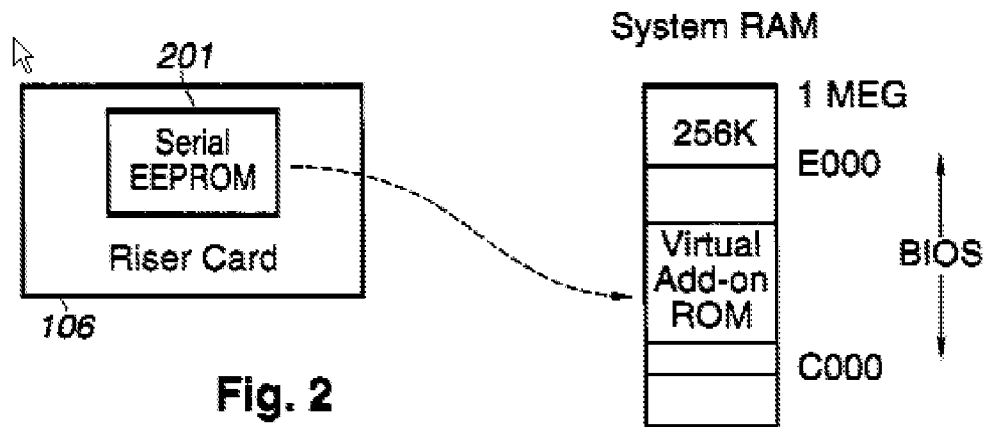
200

FIGURE 2A



"In the embodiment of Figure 2A, firmware module 210 . . . [is] relocated to writeable memory 603 during the boot-up operation." (Spec. 7.)

3. Maleck's Figure 2 follows.



"FIG. 2 illustrates copying of information within an EEPROM in a riser card to system memory" (Col. 3, ll. 22-23.) The reference includes the following explanation about the depicted copying.

Performance can be enhanced by "shadowing" the data in the EEPROM 201 into system memory 304 (controlled by a BIOS setting). This "shadowing" is a well-known mechanism that exists in the platform BIOS that will automatically copy the memory into system RAM. This will enhance the execution performance by lowering access time to ROM data (executes from system RAM after copying).
(Col. 5, ll. 27-34.)

ANALYSIS

The Appellants do not contest "that [their] use of the word 'relocating' is somewhat misleading because while a firmware module can be copied onto a writeable area and executed, it cannot be moved to a writeable area)" (Answer 4) nor that "[b]y definition, a piece of ROM code cannot be moved without physically removing the ROM chip. It can only be copied." (*Id.* at 10.) We agree with the Examiner "that Appellant's [sic] claimed 'relocation' of firmware to a writeable memory location is actually copying of the code in ROM to RAM and executing the code in RAM (see Specification, figure 2A)." (*Id.*; see FF 2.) Giving claim 1 the broadest, reasonable construction, therefore, the limitations require copying a firmware module from a ROM location to a writeable memory location.

Turning to the prior art, Maleck copies information within an EEPROM to a RAM. (FF 3.) For their part, the Appellants admit that "Malek [sic] . . . teaches . . . 'ROM contents are shadowed into main memory.'" (App. Br. 12.) Although they allege that shadowing contents is very different from relocating a firmware module (*id.*), they fail to explain any difference, let alone show any evidence thereof. Such an allegation does not establish error.

CONCLUSION

Based on the aforementioned facts and analysis, we conclude that the Appellants have shown no error in the Examiner's finding that Maleck relocates a firmware module from a ROM location to a writeable memory location.

Appeal 2009-002487
Application 10/737,106

DECISION

We affirm the rejections of claims 1-25.

No time for taking any action connected with this appeal may be extended under 37 C.F.R. § 1.136(a)(1). *See* 37 C.F.R. § 1.136(a)(1)(iv).

AFFIRMED

erc

HEWLETT-PACKARD COMPANY
Intellectual Property Administration
3404 E. Harmony Road
Mail Stop 35
FORT COLLINS CO 80528